ZipDX®

January 3, 2011

Via ECFS

Marlene Dortch
Federal Communications Commission
445 12th Street SW
Washington, DC 20554

Re: WC Docket 06-122, *Universal Service Contribution Methodology*

Dear Ms. Dortch:

I submit the following comments regarding Universal Service reform, on behalf of myself and my company, ZipDX LLC.

ZipDX LLC is a start-up provider of next-generation remote collaboration services, and has submitted comments in the past regarding FUSF and inter-carrier compensation. I am not an expert on either of these topics, but offer these comments in the hope that a view from an alternative perspective might be useful.

I comment here only on the "contribution" side of the FUSF equation, because I have ZERO familiarity with the recipient side.

CONTRIBUTION PHILOSOPHY

The "new" FUSF should strive for simplicity and for minimization of the administrative burden imposed by the Fund. Less money spent on administration (both by the Fund itself, and by contributors to it) means there should be more money available for actual delivery of benefits.

Given that virtually ALL United States households are now somehow connected to the PSTN and the Internet, EVERYBODY will end up paying into FUSF. Bear in mind that when FUSF is assessed on a service provider (or other commercial entity), they must somehow pass that cost on to their customers. They may do it via an explicit line item on the bill, or it may be buried in other costs. But it is the end customer that ultimately pays.

It is administratively advantageous to have fewer, rather than more, commercial entities paying into the fund. As long as those that do pay "touch" every end-user, the system can be simple, equitable and viable.

Thus, contributions to FUSF should be based on physical CONNECTIONS to the network. The "contributors" to FUSF will be the service providers that deliver those connections, and in turn, their customers (which, as noted, is pretty much everybody). (By the way, that there is an elegant symmetry here in that, presumably, the RECIPIENTS of funds from FUSF will also be service providers that deliver network connections. The "haves" are helping out the "have nots." Providers in high-cost areas will obviously get back more than they pay in.)

CONTRIBUTION CALCULATION

A contribution system that mandates fees based on revenues might seem attractive, because it would mandate larger contributions from those that pay more for their network connectivity (and thus probably derive more value from it, and are more able to pay).

Regulating this way, however, is fraught with peril. The regulations will always be behind the market; new technologies and services are appearing regularly and the regulations will not keep up. Under a

revenue-based scheme, we would have to ask which revenue sources would be included in the contribution base – narrowband, broadband, entertainment? What about non-end-user revenues, such as from advertising or payments from "upstream" providers? As the regulations evolve in complexity, providers and even their customers will invent convoluted schemes to try to minimize their FUSF obligations, driving even more complexity.

The solution is to have "last mile" service providers pay into FUSF based on their access infrastructure using a fairly simple formula. The service provider can then choose, based on market dynamics, how to pass that expense on to their customers.

I propose that service providers pay into FUSF based on "aggregate connectivity capability." This could be calculated in several different ways and would differ depending on how the provider connects its customers.

- Wireline Providers (including local telephone companies, cable operators, power companies) would be assessed based on "connected customers" where "customer" is a distinct service address (household or business), and "connected" means a two-way connection (voice, data, video, or some combination).
- Wireless Providers (mobile telephone operators and providers of fixed wireless services) would be assessed based on MHz-POP of licensed spectrum, or based on installed base station transceiver capacity (combined voice and data).
- Satellite Operators would be assessed based on some similar formula reflective of their activated capacity.

A number of providers would be excluded:

- Broadcasters of one-way free-to-air signals (such as conventional radio and television stations)
- Providers operating exclusively on their own owned or leased property (such as a university or a hotel) – however, the provider delivering connectivity to such an entity would be assessed
- Services delivered over unlicensed wireless spectrum (but those providers serving the "hot spot" operators WOULD pay into FUSF)
- "Closed" (private) networks that do not and cannot "leak" traffic to or from the public networks

As is currently the case, assessed providers would self-report and submit payments quarterly. Regulators would periodically adjust the assessment rates to maintain the necessary funding levels.

APPLICATIONS

In this proposal, we DO NOT assess FUSF on any "applications." The scheme does not look beyond basic connectivity. Voice-mail, long distance, phone numbers, video calling, music streaming, pornography, newspaper and magazine content, on-line gaming, movies, photo sharing, text messaging – none of that matters. Of course, all these applications USE network connectivity, so end-users of these services will necessarily be customers of some connectivity provider, and that provider will be paying into FUSF for that user's connection.

JURISDICTION

By virtue of connection to the public networks (PSTN and/or Internet), the assessed providers are enabling interstate communications. Trying to segregate individual messages as being "inter-state" or "intra-state" is fruitless and, as we are increasingly coming to discover, often impossible.

By basing FUSF solely on "last mile connectivity" without trying to determine the source, destination, or function of any specific message, we avoid all sorts of administrative complexity and eliminate an entire source of arbitrage.

States and other taxing jurisdictions should similarly be encouraged to restrict their own assessments to the physical connections within their boundaries, and to refrain from methodologies that assess based on message content (including origin/destination).

By focusing on connections made to users in the United States, and not attempting to assess FUSF on applications, we avoid the dilemma poised by services that are based beyond US borders. A system that makes application providers pay into FUSF will put American providers of those applications at a disadvantage to those based overseas (who would escape US assessments).

REFINEMENTS

Of course, the devil is always in the details and additional refinements will be required to make this plan as fair as possible to all parties, while also insuring that the regulations encourage the "right" behavior.

On the wireline side, I have suggested assessing a fixed fee per connected customer regardless of connection details. But you might decide that the assessment should scale somewhat with, for example, "upstream" bandwidth, so that the assessment associated with a POTS connection would be X, while a DSL connection would be 4X and a fiber connection would be 10X.

However, we must exercise caution with these schemes, because we don't want to discourage (through higher assessments) the deployment of more capable technology.

Two of our objectives are to as "application agnostic" and "supplier neutral" as possible. A cable MSO offering telephone service in conjunction with a cable modem shouldn't have to pay more into FUSF than the fund would collect if the customer instead elected to use an "over the top" voice supplier. (In our scheme, the over-the-top supplier would not pay into FUSF.) Thus, assessments should be based on the highest level of connectivity provided, not an accumulation of fees for various derived services.

Careful thought must be given to assessment methodology for commercial access – e.g., server farms and content delivery networks. Perhaps FUSF contribution scales to OC-192 access and beyond, and perhaps the contribution from a service provider with a "captive CDN" should be equivalent to what would be assessed if the CDN were independent. "95th percentile" metrics might prove useful here.

CONCLUSIONS

We have suggested a framework for an FUSF contribution scheme that limits the number of direct contributors and is administratively simple. How the FUSF expense is passed to end-users will be a function of the market, which generally does a better job than the regulators in reacting to end-user preferences, market shifts and technology evolution.

The goal of FUSF is to get more people connected to the information superhighway, ideally at faster and faster speeds. Basing contributions on the current "on-ramps" (and their capacity) makes sense, especially when we're going to us the funds to build more (and bigger) on-ramps. It doesn't make sense to worry about what's inside the vehicles, or where they're going.

Regards,

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